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ONE MORE TIME - CAN AIRPOWER WIN THE WAR?

BY

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A paper submitted to the Faculty of the Naval War College in partial satisfaction of the requirements of the Department of Operations.

The contents of this paper reflect my own personal views and are not necessarily endorsed by the Naval War College or the Department of the Navy.

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This paper addresses the airpower theories of Douhet and Mitchell as they apply to the four modern wars the United states has been involved in. It looks at conditions that did and did not exist in each conflict, looking for commanalities that depressed the role or results of airpower in each. This paper addresses issues from the perspective of basic airpower theory overlaid on generalities of each war. This essay finds that the relative domination of airpower as a force in war is dependant to political and geographical concerns rather than doctrine. It concludes that altough airpower won't win all wars in the future, the potential to win wars is there if political aims and battlefield physical constraint coexist in the appropriate manner.

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Abstract of

One More Time - Can Airpower Win the War?

This paper addresses the airpower theories of Douhet and Mitchell as they apply to the four modern wars the United States has been involved in. It looks at conditions that did and did not exist in each conflict, looking for commonalities that depressed the role or results of airpower in each. This paper addresses issues from the perspective of basic airpower theory overlaid on generalities of each war. This essay finds that the relative domination of airpower as a force in war is dependant to political and geographical concerns rather than doctrine. It concludes that although airpower won't win all wars in the future, the potential to win wars is there if political aims and battlefield physical constraint coexist in the appropriate manner.

INTRODUCTION

Certainly one of the most contested/discussed military theories this century finds root in the writings of Giulio Douhet. The derived issue of "can airpower win the war," thus making other warfighting components obsolete (or subservient), certainly evokes an emotional response, if not rational, by both proponents and opponents alike. Throughout this century in the U.S., such thoughts and theoretical underpinnings have had effects on people and organizations that run the spectrum of possibility, from the court martial of General "Billy" Mitchell to the elevation to near "God" status of General Curtis Lemay in the 1950's. The theory itself remains unproven today, even though the U.S., its friends and foes have had ample opportunity to settle the issue since Douhet first published The Command of the Air in 1921.

It is not my intention to prove or deny the theories that surround the Airpower issue but to take another look at Douhet's and Mitchell's pronouncements and overlay them on multiple cases of modern warfare. I believe by limiting the theoretical discussion to the earliest and most basic theses allow for analysis on the grand scale vice being down in the weeds inciting service parochialism. I will examine the cases with an eye for key elements of the conflict, political and physical, that may have (in some cases did) altered the role of airpower as a single entity or elevated it to supported, vice a supporting role; thus attempting to derive what conditions must exist for airpower to be the dominant force.

THE THEORIES

Very much like Clausewitz, Douhet is often quoted but seldom read. An appropriate stepping off point thus is to examine the early theoretical basis of airpower as an entity unto itself. Douhet had witnessed the stalemate and attrition warfare of WWI firsthand and maintained that a nation's will was the predominant, if not the singular center of gravity for any future conflict.[1] He saw ground and naval forces as means only "to indirectly break the enemy's resistance."[2] At the risk of oversimplifying his thoughts, he envisioned self-defending airplanes overflying armies and potential battlefields, setting factories and entire cities afire, then dropping poison gas to deny access until the areas had burnt themselves out. The physical and mental effects he expected to achieve don't differ a great deal from the conditions that resulted from dropping atomic bombs on Hiroshima and Nagasaki, or the fire bombings of Hamburg, Dresden and Tokyo.

He further argued that a nation should be oblivious to the damage an enemy can do to it, because a nation must focus its entire effort to doing greater damage to the enemy. Douhet reasoned that the airplane could not economically be defended against, thus, any resources committed to defense were resources lost to building offensive capability.[3] As one reads Douhet's The Command of the Air, visions of war, much like a preemptive strategic nuclear attack, are often evoked when marrying modern

technology to the concepts developed very early in the 20th century.

General "Billy" Mitchell is perhaps the most cited father of airpower advocacy in the United States. Though when closely studied, he perhaps lent less to the theoretical development than the practical. He was regarded "...intelligent and prescient but more a quick study than original thinker, broad but rarely profound."[4] This prejudice aside, as early as 1919, Mitchell insisted that modern war engaged civilian men and women and children as well as soldiers.[5] This leads one to believe he was simultaneously developing the same theoretical background as Douhet. Most of Mitchell's contribution to airpower thoughts are in the form of practical application of theory. He believed that airpower could win the next war but differed in method from Douhet. In fact, Mitchell's basic thesis can be traced through the United States Air Force doctrine from the 1940's to the Vietnam era.

Mitchell would attack the same center of gravity (the people) as Douhet, but with an integrated air force of tactical as well as strategic assets. He predicted that the principal value would lie ultimately in "hitting an enemy's great nerve centers at the very beginning of the war so as to paralyze them to the greatest extent possible."[6] In addition to solely striking the will of a nation, Mitchell would strike warfighting capabilities of armies, navies and industry. Mitchell further broadened the dominant airpower theory to include thoughts on concentration of force, flexibility and the priority of counterair action.[7] A zealot for airpower, he

eventually became a martyr, trying to bring the U.S. military and public to his way of thinking.

In order to measure those general theories against historical examples some 70 years later, one must make some assumptions as to the conditions in which they might apply if they are not to be accepted as universal truths. In both Douhet's and Mitchell's background was the fresh experience of WWI. Their vision of war was that of total or unbounded world war. Secondly they viewed the war from above, seeing the static nature of trench warfare and the susceptibility of war to new technology (i.e., machine gun, poison gas, airplane, etc.). Their belief was that the emerging technology of powered flight was the ultimate technological breakthrough to winning <u>all</u> future wars.

Many have written on the theory of airpower but most offer only an update to include the newest technology or are simply offering permutations of the early writer's ideas. Since Mitchell's time many advocates have elaborated or attempted to put them into practice with varying degrees of success.

Few will disagree when we say that airpower has yet to win a war. But there is at least anecdotal evidence that the opposite is true. In 1920 British General Hugh Trenchard[8] took a dozen aircraft to Somaliland and in three weeks of bombing and strafing, he drove Mohammed Abdullah Hasan out of the country. The British army had attempted that same feat for twenty years and the British were on the verge of conceding the country.[9]

By investigating four modern wars that the United States has

played a key role in, we can look for a common theme or themes that are outside the scope of the earliest airpower theoreticians. Looking for answers to the question; why can we only find anecdotal evidence of success in what appears to be a well developed theory, and, when closely studied, a very believable one?

WORLD WAR II

A popular thesis, when relating airpower theories to WWII on the European continent, is that strategic bombing, in and of itself, would have caused Germany to surrender or sue for peace within 6 months had the allied armies not ended it when they did. There is at least some objective evidence to support this in the Strategic Bombing Survey conducted in the post war environment.

Taking the ideas fashioned by Douhet, with his object, "the will of the people," we must look at both sides, because Hitler made every effort to do to London what "Bomber" Harris in fact did to Dresden.

The aim of the Allies in WWII was unconditional surrender on the part of all belligerents. This is exactly what Douhet and Mitchell envisioned in their next war, and thus provides an excellent case study. But, essential ingredients are missing. The most obvious is that Douhet advocated complete dedication of resources to an offensive strategic bombing campaign, while merely taking whatever the opposition might dish out. So, at the outset, this and other preconditions he set out theoretically are missing. I'm sure, looking at the resources dedicated to land and naval forces, to the African campaign, and diversion of air assets to support ground battles, Douhet himself would not have expected the collapse that he forecast through strategic bombing. Further, the majority of bomb tonnage was dropped on Germany well after the

Normandy invasion.[10]

The Germans were the first to put forward a concerted effort against population centers. A great deal of effort was put into the type of war Douhet advocated. They put enormous resources into the bombing of London, though the area was never denied by poison gas. This bombing essentially yielded the opposite effect that Douhet expected, in that it became a rallying point for the British and served to strengthen their resolve in the conflict. It also had some unquantifiable impact on drawing the U.S. into the war.

Mitchell's approach to the same attacks would have been to use the resources to attack military/industrial capability first, coincidentally striking the country's will, while at the same time establishing air superiority. For whatever reason, the Germans did not choose this option. Multiple post war sources suggest the "Battle of Britain" may have had a much different outcome had the military/industrial complex (specifically airfields) of Great Britain been the focus of those same attacks.

The air war going west to east was conducted differently. In the early years, the battle bears close parallel to Douhet's war and transitions with the introduction of the P-51 to a situation resembling Mitchell's. In the most general sense, the early strategic efforts were focused on night bombing of industrial and population centers (de-housing campaign), but with the entry of the U.S. came daylight precision-bombing of industrial capability. Both became far more successful with the introduction of the long range fighter. It is generally held that these strategic bombing

campaigns took a significant toll on the morale of the German population. Conversely Clodfelter points out, citing the Strategic Bombing Survey, that work continued efficiently so long as the physical plant remained. Further stating, "The power of a police state over its people cannot be underestimated."[11]

One can only postulate what effects increases in resource dedication may have had. Imagine the outcome, for example, had the time and energy of the African campaign been dedicated to strategic bombing, or had the manpower and industrial capability to build the invasion force been dedicated to the strategic bombing campaign.

In the Pacific theater, one has to stretch a bit to draw the same strong an inference (though many contemporary advocates do). Counterfactual argument might place a great air armada in China, striking the Japanese homeland at will, but technology of the time just couldn't put any bombs on Japan without the efforts of land and naval forces throughout the vast expanse of the Pacific. But in the end, a holocaust, just as Douhet would have ordered, coerced the Emperor to intervene with surrender. Even without the atomic bombs, the Strategic Bombing Survey concludes,

> based on a detailed investigation of all the facts, and supported by the testimony of the surviving Japanese leaders involved, it is the Survey's opinion that certainly prior to 31 December 1945, and in all probability prior to 1 November 1945, Japan would have surrendered even if the atomic bombs had not been dropped, even if Russia had not entered the war, and even if no invasion had been planned or contemplated.[12]

From this very general discussion, it is reasonable to draw the following: 1. The war aim was complete capitulation. 2. Less resources were dedicated to building air forces than was possible. 3. The airpower doctrine was not focused, thus allied strategy made no attempt to win the war by airpower alone unless one takes the dropping of the atomic bomb as a case unto itself. 4. The battle area was politically unconstrained, thus containing all industrial capabilities.

KOREA

The Korean conflict again offered an opportunity to test theories and practice of airpower. Air superiority was attained with relative ease and very early. With relative impunity, all relevant strategic targets were destroyed, again, early in the conflict. The Korean action, though, was not an unlimited war. Severe political and physical constraints were placed on warfighting. Potential energy and resources were not dedicated to air forces, because, in this case, there were forces in being. The low state of U.S. military readiness certainly contributed to this but examination of forces available versus those applied gives assurance that there was no attempt to "win by the air" before or after the Chinese entered the conflict. In Korea, only two low priority B-29 squadrons were ever employed while modern B-36 and B-47's remained back to "deter."

A common explanation for this curious strategy was that all strategic targets had been struck. Even if one accepts that, the enormous heavy bombing potential that could have been applied against ground forces and other so-called tactical targets is overlooked. This did not fit the "strategic" dominance of the U.S. policies of the time. This can be attributed to any number of reasons or combinations thereof.

Internationally the "real" threat was perceived to be from the Soviet Union. Also a great worry was, "the effect losing even a

single heavy bomber would have on the image of our strategic deterrent."[13] (This is evident throughout the Lemay years from Korea well into the Vietnam era.)

Because of political constraints, the strategic targets that Douhet and Mitchell would have advocated were never struck. Fire bombing of population centers was employed but with a curious approach. For only a two week period, 10 villages, immediately south of the Yalu, were targeted but with the intention of denying the invading Chinese of shelter.[14] It appears that this aberration to the norm was treated only as an interdiction and by its limited scope not directed at civilian morale. Further, the Far Eastern Air Forces (FEAF) had a plan on the shelf to carry the war to the people but when he proposed it, General O'Donnell (commander FEAF) was told, "overriding political and diplomatic considerations prevented its acceptance."[15] As another example, when dams finally made the target list, the purpose of their destruction was to interdict by washing out bridges and roadways. The fact that great care was taken not to strike a dam that would destroy too many (or exclusively) rice crops, marks a change of either moral values or warfighting aims really quite new to U.S. thought.

One can deduce then, that defeating the people's will was not an aim of the conflict. There are many published counterthoughts to this particular slant but clearly overriding political fears constrained the airpower contribution.

The Korean battlefield was constrained in the military/industrial sense. North Korea, at the time, had little

ability to generate war materials on its own soil, being supported and supplied by China and to a lesser extent the Soviet Union. This fact, coupled with the U.S. political constraint of not striking beyond the Yalu River, makes any application of Mitchell's order of battle academic. Thus one would not expect airpower to win on that basis alone. But granting that, concentration of available forces on the military itself was not done.

We come away from Korea with airpower given credit for significant contribution, but definitely not the decisive power that appeared to be in its potential. Drawing from this experience the following generalizations are appropriate: 1. This was a war of limited aims. 2. The battle area was constrained, but the enemy's industrial potential was not. 3. U.S. doctrine and policy prevented concentration of available airpower. 4. Political considerations prevented the attack of targets that airpower advocates would use to erode North Korean will.

VIETNAM

With its relation to the use of airpower, Vietnam is an anomaly. Like the Korean conflict, at best this was a war of limited aims and at worst changing aims. Colonel Dennis Drew offers a most appropriate characterization of the entire war, land and air, when describing target selection for the "Rolling Thunder" bombing campaign of 1965.

> The results of this torturous process were target choices that the military considered insufficient to accomplish the purpose of Rolling Thunder, and rules of engagement that the military thought were far too restrictive to conduct effective and efficient military operations.[16]

Again like Korea, we fought in a constrained battle area with the industrial support in and from the Soviet Union therefore untargetable. It is arguable whether the conflict was even prosecuted to a favorable end at all, little alone won by air assets. Our failure, though, is found in politics, not in military capability, tactic or strategy.[17]

All that said, there are still good airpower lessons to be learned from this conflict. With the exceptions of Linebacker I and II, airpower was never concentrated, and to a large extent, the enemy will to continue was never a target. When Linebacker II was at its peak, without a doubt, the North Vietnamese hurried back to their negotiation table, and it is very arguable that had the bombing of Hanoi continued, the outcome would have been entirely different. But the bombing was stopped and the results are common

knowledge.

Very similar to earlier examples we can draw the following: 1. With limited aims (and changing), there was never a commitment to win by employing airpower strategy. 2. Again the battle area was constrained but war supporting industrial capability was not. 3. Efforts were made to attack the will of the people, but only sporadically and inconsistently.

DESERT STORM

Desert Storm offers a completely different perspective of waging war in the post WWI era. Depending on ones perspective, it can successfully be argued that airpower contribution falls somewhere between the dominant contribution to winning, to the outright winning force. Where its contribution lies is not the point of this paper but how was it conducted compared to the early theories.

A major stepping off point is the environment of the conflict. Though this was a war of limited aims, those aims were well defined and generally unchanging. This again was a constrained battle area but the war-making potential was also. This was so because, thanks to a near universal blockade, any war-making material had to be generated by Iraq herself within the bounds of the battle area. This rendered a scenario very much like early theorists envisioned. The air portion of the campaign could have been written by General Mitchell himself; coordinated tactical and strategic attacks that yielded early air supremacy, followed by methodically attacking the war-making capability, overflying the "front line." Perhaps the only departure from Douhet's and Mitchell's visions of prior to 1920 was that the civilian population itself was not attacked. As far reaching as their thought was, it is doubtful that either ever envisioned the ability to drop a 2000-pound bomb so accurately that a specific portion of a building could be targeted. Thus the

"nerve centers" that exist within the urban areas were struck, but the people themselves physically spared. In fact, the population was for a time a tentative target, but that portion was never executed. Very early in Desert Shield, had Sadam continued his offense into Saudi Arabia, B-52's on Diego Garcia were prepared to "flatten" Iraq. "... the targets were military, not cities, but the goal was to inflict so much damage that the entire country would come to a halt."[18]

If Desert Storm becomes a classic case of airpower employment, then why wasn't it won by airpower alone? First, that was never the strategy, though had the Iraqi population or army given up prior to January 15th, I don't believe complaints would have been heard from other than Army and Navy budgeteers. Secondly, by January 15th, the aims of the air campaign war had been accomplished (Iraqi army at approximately 50% combat effectiveness). To continue solely an air battle at this point would have crossed the point of diminishing returns thus lengthening, unnecessarily, the conflict. One can go back all the way to the Peloponnesian Wars to find numerous examples of the adverse effect protracted wars have on democracies.

Thus it would appear that the SW Asian conflict would have been a tailor-made conflict to be prosecuted solely from the air. Looking at the limited aims, though, this probably could not have been executed within those constraints. The aims never included breaking the people, in fact, President Bush repeated multiple times to the world that our fight was not with the people but with

Sadam and his aggression. Again going back to the earliest airpower theorist, the people and thus the society had to be the target. Employment of that strategy in this case would have left an unacceptable power vacuum in the region and the Iraqi society collapsing upon on itself.

Generalizations germane to this discussion are: 1. This was again a limited war but differed from the previous two examples in that the industrial capability was contained within the battle area. 2. Airpower employment was focused and war aims were unchanging. 3. Though it was well within our capability, the people were not directly targeted. 4. The CINC's strategy did not attempt to win by air power alone.

CONCLUSIONS

If one excludes Trenchard's foray into Somaliland, airpower still hasn't won a war. But, these brief discussions and inquiries beg the question; can a theater CINC or even a nation expect to win a war through the exploitation of airpower alone? It is the opinion of this author that the answer is "probably yes" at least on the theoretical level. It appears that early and contemporary airpower advocates are correct as far as they go. That is, airpower can be the dominant factor. However, changing U.S. moral values and technology have rendered airpower such that it can dominate the war only when a specific set of political and geographical circumstances exist.

The nation making war solely from the air would have to dedicate disproportionate amounts of its defense budget to air assets at the expense of other forces. A situation, in the U.S. at least, not likely happen. Rightfully so! The most obvious reason is a hedge against technological surprise.

Changing political and moral values, I believe, place the greatest restraint on full employment or airpower. In the years following WWII, the scope of effects of a nuclear weapon became more generally known and much publicized. Just such weapons became the backbone of U.S. defense efforts throughout the 1950's but the pendulum has swung to the other extreme. International sentiment and national policies make the use of such a weapon unconscionable. Further, the use of any "weapon of mass destruction" has been

elevated to the same level. One can easily extend this to mean that the targeting of population centers is unacceptable (at least from U.S. perspective). In fact, corollaries of this idea are now codified in international law. Continuing the thought; a train of 1000-pound bombs from a B-52 can be a weapon of mass destruction, if its falling in a population center. The vision of this spectacle is all but totally unacceptable in light of contemporary standards and political considerations.

This phenomena in itself, and bolstered by the technology display of Desert Storm, makes the targeting of national will through destruction politically forbidden. Using the standard of Desert Storm, it seems that warfighting has come full circle and we are now paralleling the mid-1800's, as professional armies (and air forces) square off against each other while the population of a belligerent nation goes about its business. Thus the experiences of Douhet and Mitchell, over an entire continent embroiled in battle, become somewhat irrelevant.

As one looks ahead, it is very difficult to envision other than limited war with limited goals. Both of which, in my opinion, do not lend a battle area that is conducive to success from airpower alone, but demand a balance of ground, air and naval forces that can be custom fit to the appropriate war. We must remember though, that the treaty of Versailles made war "obsolete". The lesson to be drawn then, for the CINC and his planners alike, is that airpower may or may not be the most economical way to fight exclusively, but if the political and geographical conditions fit,

it is appropriate to set service parochialism aside. One must also consider this possibility; maybe, the only reason that airpower has never won a war is because -- no one ever tried.

NOTES

1. Though European, I find no evidence that Douhet had studied Clausewitz, but his ideas certainly have a Clausewitzian ring to them.

2. Giulio Douhet, The Command of the Air, translated by Dino Ferrari, (Washington: U.S. Government Printing Office, 1983) p. 188

3. Ibid. p. 59

4. James T. Nevin, Architects of Air Power. (Arlington: Time-Life Books, 1981), p. 54

5. Ibid. p. 54

6. Thomas H. Greer, The Development of Air Doctrine in the Army Air Arm, 1917 - 1941, (Washington: U.S. Government Printing Office, 1985), p. 5 This sounds, interestingly, very much like the first day Air Tasking Order for Desert Storm.

7. Ibid. p. 5

8. Mitchell's equivalent in the RAF and in many ways Mitchell's early mentor.

9. Nevin, p. 33

10. Dennis M. Drew, Rolling Thunder 1965: Anatomy of a Failure, (Maxwell AFB: Air University Press, 1986) p. 18

11. Mark Clodfelter, The Limits of Air Power, (New York: The Free Press, 1989), p. 9

12. The United States Strategic Bombing Survey, Summary Report (Pacific War) (Washington, D.C.: Government Printing Office, 1 July 1946)

13. Thomas A. Keaney, Strategic Bombers and Conventional Weapons - Airpower Options, (Washington: National Defense University Press, 1984) p. 20

14. Robert F. Futrell, "Tactical Employment of Strategic Air Power in Korea," (Air Power Journal, Winter 1988), p. 38

15. Futrell, p. 31

16. Drew, p. 35

17. Ross T. Milton, "Strategic Airpower: Retrospect and Prospect," (Strategic Review, Spring 1991), pp. 7-15

18. "The Road to War." (News Week, January 28, 1991), p.60